

Date: Wednesday, 7/4/2007 3:51:52 PM  
 User: Eric Charbonneau

## Process Sheet

Customer : CU-DAR001 Dart Helicopters Services	Drawing Name : UPPER AND LOWER PLATE
Job Number : 33303	
Estimate Number : 12838	
P.O. Number : N/A	Part Number : D3524041
This Issue : 7/4/2007 S.O. No. : N/A	Drawing Number : UNDER REVIEW
Prsht Rev. : NC	Project Number : N/A
First Issue : N/A	Drawing Revision : N/A
Previous Run : 32206	Material : N/A
Written By : J.F. 07/07/12	Due Date : 7/11/2007
Checked & Approved By : J.F. 07/07/10	Qty: 2 Um: Each
Comment : Est Rev: A New Issue 07-04-18 EC	

# PROTOTYPE

Additional Product

Seq. #:	Machine Or Operation:	Description :
1.0	M6061T6B0375X03000	6061T6 BAR 375 X 3.00
Comment: Qty.: 0.3236 f(s)/Unit Total : 0.6472 f(s) 6061-T6 Bar 375" X 3.00" batch: M18237		CERTIFICATE OF CONFORMITY REQUIRED J.F. 07/07/10
2.0	BAND SAW	BAND SAW
Comment: BAND SAW Cut blank 3.700 " long		J.F. 07/07/10
3.0	HAAS1	HAAS CNC VERTICAL MACHINING #1
Comment: HAAS CNC VERTICAL MACHINING #1 1- Mill as per Folio FA700 Rev: AA & Dwg D3524 Rev: A 2- Deburr per dwg D3443		J.F. 07/07/10
4.0	QC2	INSPECT PARTS AS THEY COME OFF MACHINE
Comment: INSPECT PARTS AS THEY COME OFF MACHINE		J.F. 07/07/11
5.0	QC8	SECOND CHECK
Comment: SECOND CHECK		J.F. 07/07/11

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Part Number: D3524041

Job Number:



Seq. #:	Machine Or Operation:	Description :
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6.0

SMALL FAB 1

SMALL & MEDIUM FAB RESOURCE 1



Comment: SMALL & MEDIUM FAB RESOURCE 1  
C'SINK AS PER DWG D3524

MF 07-07-11

2

7.0

QC5

INSPECT WORK TO CURRENT STEP



CB  
07.07.11

**ENGINEERING  
APPROVAL**



MF 07-07-11

Comment: INSPECT WORK TO CURRENT STEP

8.0

HAND FINISHING1

HAND FINISHING RESOURCE #1



Comment: HAND FINISHING RESOURCE #1  
Chemical Conversion Coat as per QSI 005 4.1

N/A

9.0

MS21075L06

ANCHOR NUT



Comment: Qty.: 4.0000 Each(s)/Unit Total : 8.0000 Each(s)  
ANCHOR NUT  
batch: M101807

10.0

MS20426AD34

RIVET



Comment: Qty.: 8.0000 Each(s)/Unit Total : 16.0000 Each(s)  
RIVET  
batch: M102404

MF 07-07-11

11.0

SMALL FAB 1

SMALL & MEDIUM FAB RESOURCE 1



Comment: SMALL & MEDIUM FAB RESOURCE 1  
RIVET NUT PLATES AS PER DWG D3524

MF 07-07-12

12.0

QC5

INSPECT WORK TO CURRENT STEP



Comment: INSPECT WORK TO CURRENT STEP

SB 07/07/12

2

13.0

PACKAGING 1

PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1  
Identify and Stock  
Location: \_\_\_\_\_

**FOR ENGINEERING USE ONLY**

07 07 19

Date: Wednesday, 7/4/2007 3:51:52 PM  
User: Eric Charbonneau

## Process Sheet

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Drawing Name: UPPER AND LOWER PLATE

Job Number: 33303

Part Number: D3524041

Job Number:



Seq. #:

Machine Or Operation:

Description :

14.0

QC21

FINAL INSPECTION/W/O RELEASE



07.07.19

*[Signature]*

Comment: FINAL INSPECTION/W/O RELEASE

Job Completion



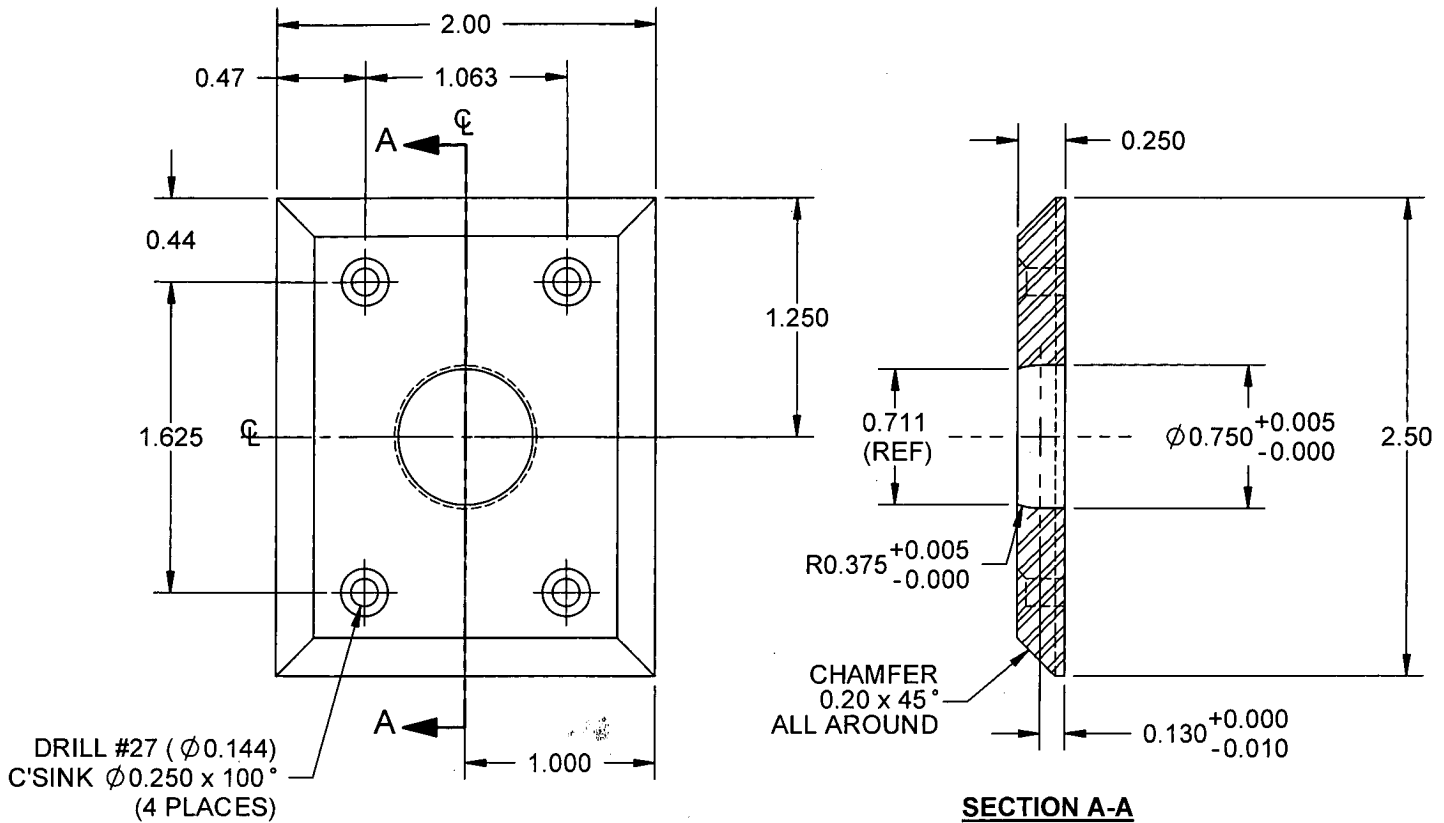
C 207/07/18

# PROTOTYPE

PLEASE RETURN ALL ISSUED  
DATA TO ENGINEERING

07.07.10 CB

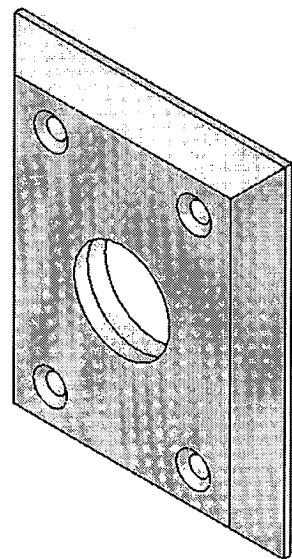
DESIGN CB	DRAWN BY CB	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
CHECKED CE	APPROVED	DRAWING NO. D3524	REV. A SHEET 1 OF 3
DATE 07.06.18	TITLE UPPER AND LOWER PLATE		SCALE 1:1
REV A	DATE 07.06.18	DESCRIPTION NEW ISSUE	



## D3524-1 LOWER PLATE

### NOTES:

- 1) MATERIAL: ALUMINUM 6061-T6/T651/T6510/T6511/T62 BAR PER QQ-A-225/8 OR AMS 4115/4116/4117/4128 OR QQ-A-200/8 OR AMS 4160 (REF DART SPEC M6061T6B)
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1  
POWDER COAT BLACK SANDTEX (4.3.5.7) PER DART QSI 005 4.3
- 3) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE NOTED
- 5) BREAK ALL SHARP CORNERS TO 0.010 MAX
- 6) PART SYMMETRIC ABOUT  $\phi$

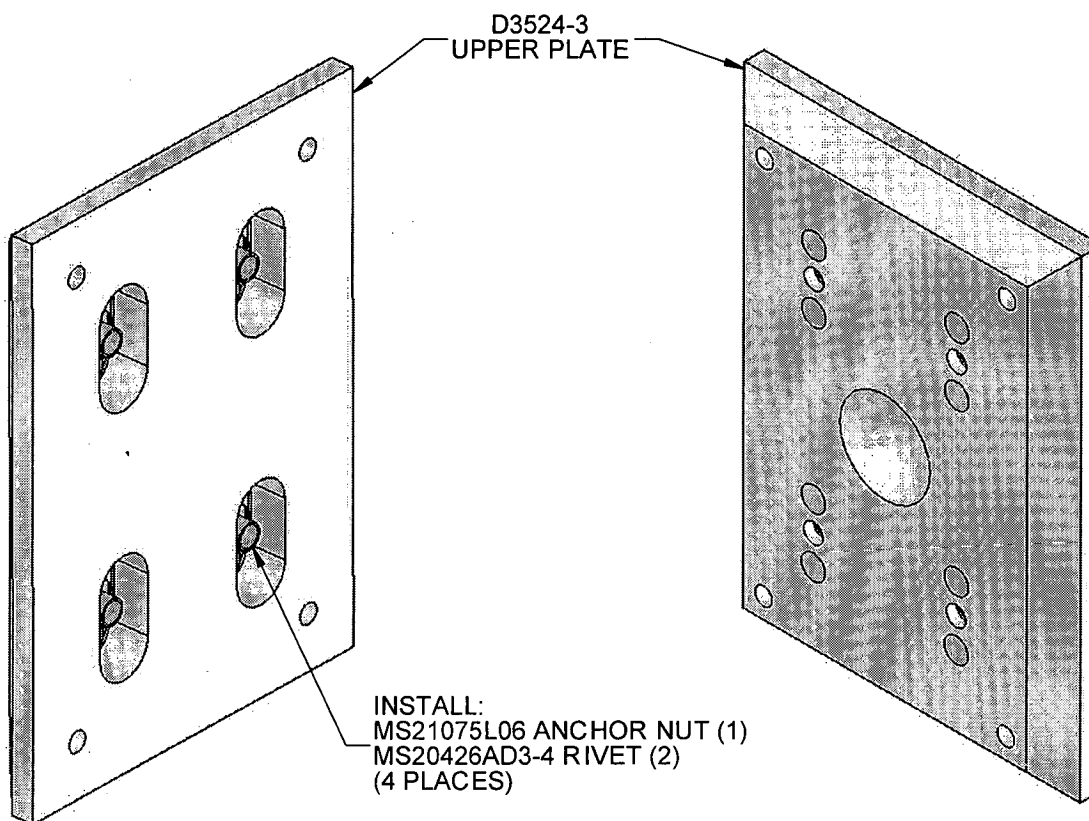


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**PROTOTYPE**  
 PLEASE RETURN ALL ISSUED  
 DATA TO ENGINEERING  
 07.07.10 CB

DESIGN CB	DRAWN BY CB	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
CHECKED LE	APPROVED	DRAWING NO. D3524	REV. A SHEET 2 OF 3
DATE 07.06.18		TITLE UPPER AND LOWER PLATE	SCALE 1:1



### D3524-041 UPPER PLATE ASSEMBLY

#### PARTS LIST:

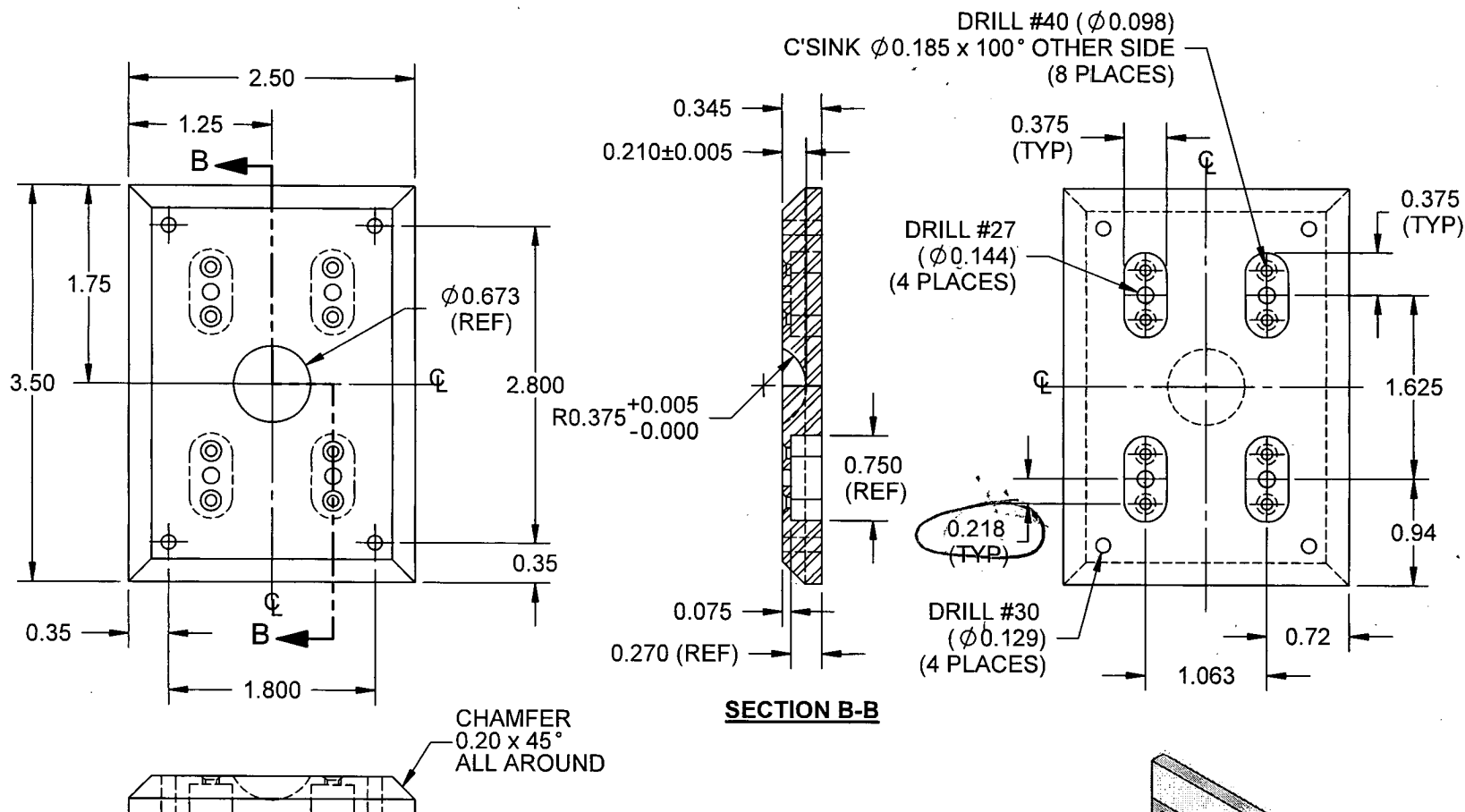
QTY	P/N	DESCRIPTION
X	D3524-041	UPPER PLATE ASSEMBLY
1	D3524-3	UPPER PLATE
4	MS21075L06	ANCHOR NUT
8	MS20426AD3-4	RIVET

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**PROTOTYPE**  
PLEASE RETURN ALL ISSUED  
DATA TO ENGINEERING  
07.07.18 C.B.

DESIGN	C.B.	DRAWN BY	C.B.	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA
CHECKED	C.E.	APPROVED		REV. A
DATE	07.06.18	TITLE	D3524	SHEET 3 OF 3
			UPPER AND LOWER PLATE	SCALE 2:3



### D3524-3 UPPER PLATE

#### NOTES:

- 1) MATERIAL: ALUMINUM 6061-T6/T651/T6510/T6511/T62 BAR PER QQ-A-225/8 OR AMS 4115/4116/4117/4128 OR QQ-A-200/8 OR AMS 4160 (REF DART SPEC M6061T6B)
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1
- 3) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE NOTED
- 5) BREAK ALL SHARP CORNERS TO 0.010 MAX
- 6) PART SYMMETRIC ABOUT  $\phi$

DART AEROSPACE LTD		Work Order: 33303
Description: upper plate		Part Number: 03524-3
Inspection Dwg: 03524 Rev: A		Page 1 of 1

### FIRST ARTICLE INSPECTION CHECKLIST

☒ First Article ☐ Prototype

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
2.50"	$\pm .030"$	2.501"	✓			
1.25"	$\pm .030"$	1.25"	✓			
1.75"	$\pm .030"$	1.75"	✓			
3.50"	$\pm .030"$	3.502"	✓			
.35"	$\pm .030"$	.346"	✓			
1.800"	$\pm .010"$	1.804"	✓			
.350"	$\pm .030"$	.353"	✓			
2.800"	$\pm .010"$	2.804"	✓			
Ø.673"	$\pm .010"$	Ø.675"	✓			
20x45°	$\pm .030"$	200"	✓			
.270"	$\pm .010"$	.270"	✓			
.075"	$\pm .010"$	.075"	✓			
.210"	$\pm .005"$	.206"	✓			
Ø.098"	$\pm .001"$	Ø.098"	✓			
Ø.144"	$\pm .001"$	Ø.148"	✓			
.375"	$\pm .010"$	.374"	✓			
.375"	$\pm .010"$	.377"	✓			
1.625"	$\pm .010"$	1.629"	✓			
.94"	$\pm .030"$	.934"	✓			
.72"	$\pm .030"$	.720"	✓			
1.063"	$\pm .010"$	1.069"	✓			
Ø.129"	$\pm .001"$	Ø.129"	✓			
.218"	$\pm .010"$	.219"	✓			
.345"	$\pm .010"$	.345"	✓			

Measured by: J.F.
Date: 07/07/11

Audited by: SA
Date: 07.07.11

Prototype Approval: CB
Date: 07.07.11

Rev	Date	Change	Revised by	Approved
A		New Issue	KJ/JLM	

# Receiving Report

Date: 05/08/09  
Supplier: Copper + Brass

Batch No: M18237  
Dart P/O: 2008415

Packing Slip: Yes ☒ No ☐  
Invoice: Yes ☐ No ☒  
Receipt: Cash ☐ Cr. ☐

Release Note Attached: Yes ☒ No ☐ N/A ☐  
Waybill Attached: Yes ☒ No ☐  
Shipment Complete: Yes ☐ No ☒  
Q.C. Inspection ☐

## Discrepancies

Part No.	Description	Quantity Ordered	Quantity Received	Quantity Returned	Quantity Short	Comments
M606IT6B0.375X01.000		48	0	0	48	

TSR No. \_\_\_\_\_

Initials of receiver (if shipment OK) CL

Production/Admin:

Date: 05/08/10  
Received/Costing: 2008415  
Initial: A

Accounting:

Date: \_\_\_\_\_  
AP/MR: \_\_\_\_\_  
Initial: \_\_\_\_\_

H:\ISO9000\Forms\Purchase\RECREPORT rev B

## SPECIAL INSTRUCTIONS

"Shipping, do not place any packages or goods on top of our material."

FULL		SCRAP		FILLED BY GM		PACKED BY		Q/A AUDIT		
CUSTOMER RECEIVING HOURS				MAX SKID WEIGHT		LOADING INSTRUCTIONS			MAXIMUM BUNDLE WEIGHT	
BOXES	BARS	CASES	CUSHP	PKGS	SKIDS	BDLS	TUBES	CTNS	FLAT	COILS
									1	
INSPECTION RECORD										

## TEST RESULTS

### CERTIFICATE OF COMPLIANCE

We hereby certify that mercury or any of its compounds are not used in the processing and distribution of our products. The products we distribute are not hazardous in their received state. For MSDS sheets go to [www.copperandbrass.com/msds](http://www.copperandbrass.com/msds) or call 248-233-5682. We hereby certify that the material above complies with the following specifications:

ASTM-B221 AMS-QQ-A-200/8

TAG NO QUANTITY UOM VENDOR VEND PO HEAT/LOT  
181934 00 31.00 LB ALCOA E 0C74914 629545-001

PCS TAG NO QUANTITY UOM VENDOR VEND PO HEAT/LOT

PCS





## INSPECTION REPORT

MADE IN BRAZIL

N.: 120085402-001

N.: AS4043DI

STANDARD: 1

SHIP COPPER AND BRASS SALES (CA)  
TO: 6905 KENDERRY GATE UNIT 4  
MISSISSAUGA - ONTARIO  
CANADA L5T 2Y8

We hereby certify that the material covered by this report has been inspected in accordance with, has been found to meet, the applicable requirements described herein, including any specifications forming accordance with, and part of the description that samples representative of the material met the composition limits and had the mechanical properties shown on the face of this sheet.

Per WILKER L. PEREIRA

QUALITY CONTROL.

Item : 07  
Alloy : 6061  
Temper : T6511

Item Description  
ALUM FLAT BAR  
.375 3.000 .000 X 12 FT

## CHEMICAL COMPOSITION

CAST	Si	Fe	Cu	Mn	Mg	Ti	Cr	Zn	V	B	Pb	Bi
19686	0.6300	0.2050	0.2670	0.0310	0.8900	0.0160	0.0440	0.0060	0.0086	0.0004	0.0032	

## EXTRUDED SHAPES

N. OF TESTS: 3

UTS ( KSI )		TYS ( KSI )		EL ( % )								
Min	Max	Min	Max	Min	Max							
41.79	43.82	37.74	40.17	15.76	16.24							
UTS ( KSI )	43.82	43.26	41.79									
TYS ( KSI )	40.17	38.12	37.74									
EL ( % )	16.24	16	15.76									

## OBSERVATIONS

ITEM IDENTIFICATION: 629545-001  
ENCOMENDA ALCOA: 14881607 ( BC132 )  
P.O. CONSIG.: C74914